'Particle stress' in disperse two-phase potential flow. H. F. BULTHUIS, A. PROSPERETTI and A. S. SANGANI *page* 1

Turbulent mixed-boundary flow in a corner formed by a solid wall and a free surface. L. M. GREGA, T. WEI, R. I. LEIGHTON and J. C. NEVES 17

The dynamics of driven rotating flow in stadium-shaped domains. J. J. KOBINE, T. MULLIN and T. J. PRICE 47

A fully nonlinear Boussinesq model for surface waves. Part 1. Highly nonlinear unsteady waves. GE WEI, JAMES T. KIRBY, STEPHAN T. GRILLI and RAVISHANKAR SUBRAMANYA 71

Axisymmetric particle-driven gravity currents. ROGER T. BONNECAZE, MARK A. HALLWORTH, HERBERT E. HUPPERT and JOHN R. LISTER 93

Interaction dynamics of solitary waves on a falling film. H.-C. CHANG, E. DEMEKHIN and E. KALAIDIN 123

Complementary approximations to wave scattering by vertical barriers. R. PORTER and D. V. EVANS 155

Air entrapment by a falling water mass. HASAN N. OĞUZ, ANDREA PROSPERETTI and ALI R. KOLAINI 181

Thermocapillary migration of a two-dimensional liquid droplet on a solid surface. MARC K. SMITH 209

Unicellular natural circulation in a shallow horizontal porous layer heated from below by a constant flux. S. KIMURA, M. VYNNYCKY and F. ALAVYOON 231

Stability of the viscous flow of a fluid through a flexible tube. V. KUMARAN 259

Towards enhancing and delaying disturbances in free shear flows. W. O. CRIMINALE, T. L. JACKSON and D. G. LASSEIGNE 283

Forced convection and sedimentation past a flat plate. NIKOLAOS A. PELEKASIS and ANDREAS ACRIVOS 301

Thermocapillary flow with evaporation and condensation under low gravity. Part 1. Non-deforming surface. G. R. SCHMIDT, T. J. CHUNG and A. NADARAJAH 323

Thermocapillary flow with evaporation and condensation at low gravity. Part 2. Deformable surface. G. R. SCHMIDT, T. J. CHUNG and A. NADARAJAH 349

Transition modes of rotating shallow water waves in a channel. KEITA IGA 367

Instability of a liquid film flow over a vibrating inclined plane. DAVID R. WOODS and S. P. LIN 391

INDEX TO VOLUME 294 408

SCHEDULE OF INTERNATIONAL CONFERENCES ON FLUID MECHANICS 410